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## DECLARATION — Utility or Design Patent Application



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PATENT & TRADEMARK OFFICE

Name **WILLIAM G. AUTON**

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**40 WRIGHT STREET, BLDG 1120**

City **HANSCOM AFB MA**

State **MA**

ZIP **01731-2903**

Country **USA**

Telephone **781-377-4072**

Fax

I hereby declare that all statements made herein of my own knowledge are true and that all statements made on information and belief are believed to be true; and further that these statements were made with the knowledge that willful false statements and the like so made are punishable by fine or imprisonment, or both, under 18 U.S.C. 1001 and that such willful false statements may jeopardize the validity of the application or any patent issued thereon.

NAME OF SOLE OR FIRST INVENTOR: ☐ A petition has been filed for this unsigned inventor

Given Name **Richard A.**  
 (first and middle [if any])

Family Name **Soref**  
 or Surname

Inventor's  
 Signature

*Richard A. Soref*

<sup>2</sup> **25 Sept '03**  
 Date

Residence: City

<sup>3</sup> **Newton Centre**

State

**MA**

Country

<sup>4</sup> **USA**

Citizenship

**USA**

Mailing Address

<sup>5</sup> **45 Westgate Road, Newton Centre, MA 02459**

City

State

ZIP

Country

NAME OF SECOND INVENTOR:

☐ A petition has been filed for this unsigned inventor

Given Name **Jose**  
 (first and middle [if any])

Family Name **Menendez**  
 or Surname

Inventor's  
 Signature

*Jose Menendez*

<sup>2</sup> **11/5/03**  
 Date

Residence: City

<sup>3</sup> **TEMPE**

State

**AZ**

Country

<sup>4</sup> **USA**

Citizenship

**USA**

Mailing Address

<sup>5</sup> **309 E. 14TH ST.**

City

**TEMPE**

State

**AZ**

ZIP

<sup>85281</sup> **USA**

Country

**USA**

☒ Additional inventors are being named on the <sup>1</sup> supplemental Additional Inventor(s) sheet(s) PTO/SB/02A attached hereto.

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**DECLARATION FOR UTILITY OR  
DESIGN  
PATENT APPLICATION  
(37 CFR 1.63)**

☒ Declaration Submitted with Initial Filing      OR      ☐ Declaration Submitted after Initial Filing (surcharge (37 CFR 1.16 (e)) required)

Attorney Docket Number AFB00670

First Named Inventor Richard A. Soref - et al

**COMPLETE IF KNOWN**

Application Number

Filing Date

Art Unit

Examiner Name

As the below named inventor, I hereby declare that:

My residence, mailing address, and citizenship are as stated below next to my name.

I believe I am the original and first inventor of the subject matter which is claimed and for which a patent is sought on the invention entitled:

Strain-Engineered Direct-Gap  $\text{Ge/SnGe}_{1-x}$  Heterodiode and Multi-Quantum-Well-  
Photodetectors, Lasers, Emitters and Modulators grown on  $\text{SnSiGe}_{1-y-z}$ -  
Buffered Silicon

(Title of the Invention)

the specification of which

☒ is attached hereto

OR

☐ was filed on (MM/DD/YYYY)

as United States Application Number or PCT International

Application Number

and was amended on (MM/DD/YYYY)

(if applicable).

I hereby state that I have reviewed and understand the contents of the above identified specification, including the claims, as amended by any amendment specifically referred to above.

I acknowledge the duty to disclose information which is material to patentability as defined in 37 CFR 1.56, including for continuation-in-part applications, material information which became available between the filing date of the prior application and the national or PCT international filing date of the continuation-in-part application.

I hereby claim foreign priority benefits under 35 U.S.C. 119(a)-(d) or (f), or 365(b) of any foreign application(s) for patent, inventor's or plant breeder's rights certificate(s), or 365(a) of any PCT international application which designated at least one country other than the United States of America, listed below and have also identified below, by checking the box, any foreign application for patent, inventor's or plant breeder's rights certificate(s), or any PCT international application having a filing date before that of the application on which priority is claimed.

Prior Foreign Application Number(s)	Country	Foreign Filing Date (MM/DD/YYYY)	Priority Not Claimed	Certified Copy Attached?	
				YES	NO
			<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
			<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
			<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
			<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>

☐ Additional foreign application numbers are listed on a supplemental priority data sheet PTO/SB/02B attached hereto:

[Page 1 of 2]

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**DECLARATION****ADDITIONAL INVENTOR(S)****Supplemental Sheet**Page 1 of 1

<b>Name of Additional Joint Inventor, if any:</b>		<input type="checkbox"/> A petition has been filed for this unsigned inventor	
<b>Given Name</b> John		<b>Family Name or Surname</b> Kouvetakis	
<b>Inventor's Signature</b> <i>J Kouvetakis</i>		<b>Date</b> 11/11/03	
<b>Residence: City</b> <sup>3</sup> Mesa	<b>State</b> <sup>4</sup> AZ	<b>Country</b> USA	<b>Citizenship</b> USA
<b>Mailing Address</b> <sup>5</sup> 7032 E Indigo St			
<b>Mailing Address</b>			
<b>City</b> MESA	<b>State</b> AZ	<b>ZIP</b> 85207	<b>Country</b> USA
<b>Name of Additional Joint Inventor, if any:</b>		<input type="checkbox"/> A petition has been filed for this unsigned inventor	
<b>Given Name</b>		<b>Family Name or Surname</b>	
<b>Inventor's Signature</b>		<b>Date</b>	
<b>Residence: City</b>	<b>State</b>	<b>Country</b>	<b>Citizenship</b>
<b>Mailing Address</b>			
<b>Mailing Address</b>			
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PTO/SB/81 (02-01)

Approved for use through 10/31/2002. OMB 0651-0035

U.S. Patent and Trademark Office; U.S. DEPARTMENT OF COMMERCE

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## POWER OF ATTORNEY OR AUTHORIZATION OF AGENT

Application Number	
Filing Date	
First Named Inventor	RICHARD A. SOREF
Title	STRAIN-ENGINEERING.....
Group Art Unit	
Examiner Name	
Attorney Docket Number	AFB00670

I hereby appoint:

☒ Practitioners at Customer Number

OR

☐ Practitioner(s) named below:

Name	Registration Number
WILLIAM G. AUTON	31,320



as my/our attorney(s) or agent(s) to prosecute the application identified above, and to transact all business in the United States Patent and Trademark Office connected therewith.

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Address

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Zip

01731-2903

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781-377-4072

Fax

I am the:

☒ Applicant/Inventor.

☐ Assignee of record of the entire interest. See 37 CFR 3.71.

Statement under 37 CFR 3.73(b) is enclosed. (Form PTO/SB/96).

### SIGNATURE of Applicant or Assignee of Record

Name

JOSE MENENDEZ

Signature

*Jose Menendez*

Date

11/05/03

NOTE: Signatures of all the inventors or assignees of record of the entire interest or their representative(s) are required. Submit multiple forms if more than one signature is required, see below\*.

☐ \*Total of \_\_\_\_\_ forms are submitted.

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Name	Registration Number
WILLIAM G. AUTON	31,320

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### SIGNATURE of Applicant or Assignee of Record

Name

JOHN KOUVEKAKIS

Signature

Date

11/12/03

NOTE: Signatures of all the inventors or assignees of record of the entire interest or their representative(s) are required. Submit multiple forms if more than one signature is required, see below\*.

☐ \*Total of 3 forms are submitted.

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